

United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/933,786	08/20/2001	Sam B Sandbote	4800P008	6730
26384	7590 01/18/2005		EXAMINER	
NAVAL RESEARCH LABORATORY ASSOCIATE COUNSEL (PATENTS) CODE 1008.2 4555 OVERLOOK AVENUE, S.W. WASHINGTON, DC 20375-5320			KIM, KENNETH S	
			ART UNIT	PAPER NUMBER
			2111	
			DATE MAILED: 01/18/2005	

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)		
Office Assistant Commence	09/933,786	SANDBOTE, SAM B		
Office Action Summary	Examiner	Art Unit		
	Kenneth S KIM	2111		
The MAILING DATE of this communication app Period for Reply	pears on the cover sheet with the	correspondence address		
A SHORTENED STATUTORY PERIOD FOR REPLY THE MAILING DATE OF THIS COMMUNICATION. - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication. - If the period for reply specified above is less than thirty (30) days, a reply - If NO period for reply is specified above, the maximum statutory period w - Failure to reply within the set or extended period for reply will, by statute, Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	36(a). In no event, however, may a reply be ting within the statutory minimum of thirty (30) day will apply and will expire SIX (6) MONTHS from a cause the application to become ABANDONE.	mely filed ys will be considered timely. the mailing date of this communication. ED (35 U.S.C. § 133).		
Status				
1) Responsive to communication(s) filed on Dece	mber 17, 2004			
2a)⊠ This action is FINAL . 2b)□ This	☐ This action is FINAL . 2b)☐ This action is non-final.			
3) Since this application is in condition for allowar closed in accordance with the practice under E	· ·			
Disposition of Claims				
4) ☐ Claim(s) 1-33 is/are pending in the application. 4a) Of the above claim(s) is/are withdray 5) ☐ Claim(s) is/are allowed. 6) ☐ Claim(s) 1-33 is/are rejected. 7) ☐ Claim(s) is/are objected to. 8) ☐ Claim(s) are subject to restriction and/or	vn from consideration.	KENNETH/S. KIM PRIMARY EXAMINER		
Application Papers				
9) The specification is objected to by the Examiner 10) The drawing(s) filed on is/are: a) access Applicant may not request that any objection to the of Replacement drawing sheet(s) including the correction of the original transfer of the correction of the correction of the original transfer or the correction of the correctio	epted or b) objected to by the drawing(s) be held in abeyance. Se ion is required if the drawing(s) is ob	e 37 CFR 1.85(a). njected to. See 37 CFR 1.121(d).		
Priority under 35 U.S.C. § 119		•		
12) Acknowledgment is made of a claim for foreign a) All b) Some * c) None of: 1. Certified copies of the priority documents 2. Certified copies of the priority documents 3. Copies of the certified copies of the prior application from the International Bureau * See the attached detailed Office action for a list of	s have been received. s have been received in Applicat ity documents have been receive (PCT Rule 17.2(a)).	ion No ed in this National Stage		
Attachment(s)				
1)	4) Ll Interview Summary Paper No(s)/Mail D			
Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date		Patent Application (PTO-152)		

Application/Control Number: 09/933,786 Page 2

Art Unit: 2111

1. Claims 1-33 remain for examination.

- 2. The abstract of the disclosure is objected to because the current abstract does not reflect the inventive feature of the claimed invention to distinguish over the prior art. Correction is required. See MPEP § 608.01(b).
- 3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 4. Claims 1, 2, 11, 12, 21, and 22 are rejected under 35 U.S.C. 103(a) as being unpatentable over Groves, U.S. Patent No. 5,222,225, cited in the previous office action.

Groves teaches the invention substantially as claimed in claim 1 including an apparatus comprising:

- (a) a shift-post processor (30).
- (b) a shifter (22) to shift an operand according to an offset parameter (LSBS, starting address offset and XPCR, byte count) generating a shifted operand,
- (c) a register (26) coupled to the shift post processor capable of transferring a shift carry operand stored in the register to the shift post processor, and coupled to the shifter to store the shifted operand (col. 7, line 38) after any transfer of the shift carry operand (col. 7, line 44),
- (d) wherein the shift post processor coupled to the slitter and the register to

process the shifted operand to generate an output based on at least a control signal (col. 3, line 56) and a mask field (col. 4, line 63),

Page 3

- (e) wherein the shift post processor (30) comprises a decoder to decode the offset parameter into mask field, the mask field having a plurality of mask bits, each of the mask bits corresponding to a byte position of the shifted operand (col. 4, line 67), and
- (e) formatter coupled to the decoder to format the shifted operand using the control signal and the mask field (col. 4, line 65) claim 2,

however, does not expressly state that the mask bits corresponding to bit positions (instead of byte position) of the operand are used.

It would have been obvious to a person of ordinary skill in the art that the method is applicable to any mask type including one that corresponds to bit positions, which represent the smallest unit (col. 1, line 27; col. 2, line 35). The person would have been motivated to use a mask corresponding to bit positions, when the shift desired is in units of bits instead of bytes.

The method claims 11 and 12 and the system claims 21 and 22 are equivalently rejected based on the same reason.

5. Claims 3-10, 31, 13-20, 32, 23-30, and 33 are rejected under 35 U.S.C. 103(a) as being unpatentable over Groves, U.S. Patent No. 5,222,225 in view of Prioste, U.S. Patent No. 4,149,263, both cited in the previous office action.

Application/Control Number: 09/933,786

Art Unit: 2111

Groves teaches the invention substantially as claimed as set forth in paragraph 4, however, does not expressly state that numeric data are bit shifted with sign and zero extension.

<u>Prioste</u> teaches a method of bit shifting numeric bit data with sign and zero extension (col. 4, line 11).

It would have been obvious to a person of ordinary skill in the art that the shifter and the shift post processor can be used for processing numeric bit data combined with sign and zero extension. The person would have been motivated to use the digital data processing method to process numeric data, as numeric data is a subset of digital data.

- 6. Applicant's arguments with respect to claims 1-33 have been considered but are moot in view of the new ground(s) of rejection.
- 7. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kenneth S KIM whose telephone number is (571) 272-3627. The examiner can normally be reached on M-F (8:30-17:00).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mark Rinehart can be reached on (571) 272-3632. The fax phone numbers

Art Unit: 2111

for the organization where this application or proceeding is assigned are (703) 872-9306 for regular communications and (703) 872-9306 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (571) 272-2100

January 14, 2005

KENNETH S. KIM
PRIMARY EXAMINER